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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/510,657	05/26/2005	Toshio Kazama	AB-1387 US	9142

7590

07/28/2006

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EXAMINER

NGUYEN, VINH P

ART UNIT

PAPER NUMBER

2829

DATE MAILED: 07/28/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 10/510,657	Applicant(s) KAZAMA, TOSHIO	
	Examiner VINH P. NGUYEN	Art Unit 2829	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 10 July 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-19 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-4, 7, 9-11, 14, 17 and 19 is/are rejected.
- 7) ☒ Claim(s) 5, 6, 8, 12, 13, 15, 16 and 18 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

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1. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.
2. The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the feature of “therein the distance between the flange portion and the tip portion of the needle is substantially the same as the distance between the engagement portion and the second surface” as recited in claim 12 must be shown or the feature(s) canceled from the claim(s). No new matter should be entered.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as “amended.” If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either “Replacement Sheet” or “New Sheet” pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

3. Claim 5-6, 11-14, 16 are objected to because of the following informalities:

In claim 5, it appears that the limitation of “ the contact member on the other axial end of said coil spring consists of a coil end of said coil spring” is improper because a pair of electroconductive members have been claimed and this limitation is contradict with what has been claimed in claim 1.

In claim 6, it appears that the limitation of “ and the other contact member is installed substantially flush with the outer surface of the hlder member” is improper because a pair of electroconductive members have been claimed and this limitation is contradict with what has been claimed in claim 1.

In claim 11, it is unclear how “a flange portion” is interrelated and associated with “a second contact member”.

In claim 12, it is unclear whether the limitation of “therein the distance between the flange portion and the tip portion of the needle is substantially the same as the distance between the engagement portion and the second surface” has been shown in any of drawings? Furthermore, it is also unclear whether this limitation has support in the specification.

In claim 16, it is unclear what “a stem portion” comprises of. Is it the same as “the flange portion”?

The dependent claims 13-14 not specifically address share the same indefiniteness as they depend from objected base claims.

Appropriate correction is required.

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

5. Claims 1-4,7,11,14,19 are rejected under 35 U.S.C. 102(b) as being b by Lightbody et al (Pat # 4,528,500).

As to claims 1 and 10, Lightbody et al disclose an apparatus as shown in figure 3 having a holder member (11) defining a plurality of holder holes (openings/apertures),an electroconductive coil springs (33) received in each of the holder holes (25),each electroconductive coil springs (33) having a natural length in an uncompressed state, a pair of electroconductive members (31,32) provided on either axial end of each of the coil springs (33), an engagement portion (34,35) provided in each of the holder holes for preventing at least on of the contact members from coming off from the holder hole and wherein the coil springs being installed in the holder holes such that each electroconductive coil spring extends by its natural length under a rest condition of the contact probe.

As to claim 2, the contact members on either axial end of each coil spring comprises needle members (30,31).

As to claim 3, a pair of engagement portions (34,35) are provided in either axial end of each holder hole to prevent both of the needle members (30,31) from coming off from the holder hole.

As to claim 4, the engage portion of Lightbody et al is provided in only one of two ends of each holder hole to prevent the corresponding needle member from coming off from the holder hole.

As to claim 7, the engagement portion (34,35) comprises a shoulder defined in each holder hole.

As to claim 11, the probe of Lightbody et al further comprises a flange portion (37) with a first diameter and a second electroconduvtive contact member (30) with a tip portion disposed on the second axial end..

As to claim 14, the engage portion (34,35) comprises a shoulder portion (35) that engages the flange portion (37).

As to claim 19, it appears that the electroconductive contact probe system of Lightbody et al would include a plurality of electroconductive contact probes and a plurality of holder members in order to test different locations on the printed circuit board under test.

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claims 9 and 17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bross (Pat # 5,225,777).

As to claims 9 and 17, Lightbody et al does not disclose a holder member comprises a plurality of layered support members and the shoulder is defined between adjoining two of said support members having holder holes which are coaxial to each other but having different diameters formed therein.

However, Bross et al teach that it would have been well known for one of ordinary skill in the art to have a probe holder (20) comprises a plurality of layered support members (23,26,30,34).

It would have been obvious for one of ordinary skill in the art to provide a probe holder with a plurality of layered support member as taught by Bross et al to the device of Lightbody et al so that the warping or deflecting of the probe holder is minimized.

8. Claims 8,15 and 18 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Claim 8 is allowable since the prior art does not disclose "holder member includes a plurality of layered support member and the shoulder is defined between adjoining two of said support members having holder holes which are coaxial to each other but having different diameter.

Claim 15 is allowable since the art of record does not disclose the electroconductive coil spring further comprises a closely wound portion and a coarsely wound portion in combination with other elements in claim 10.

As to claim 18 is allowable since the art of record does not disclose a shoulder portion defined by a first hole of a first diameter in a first adjoining layer of said plurality of layer support members and a second hole of a second diameter in a second adjoining layer of said plurality of layer support members.

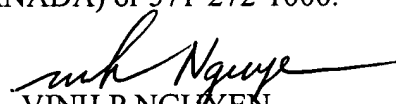
9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to VINH P. NGUYEN whose telephone number is 571-272-1964. The examiner can normally be reached on 6:30AM-4:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, HA T. NGUYEN can be reached on 571-272-1678. The fax phone number for the

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organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.


VINH P NGUYEN
Primary Examiner
Art Unit 2829

07/21/06